CASE 1-32330A

FILING BY "EXPRESS MAIL" UNDER 37 CFR 1.10

Date of Deposit

#### IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

IN RE PCT NATIONAL STAGE APPLICATION OF

KISIELOW ET AL.

INTERNATIONAL APPLICATION NO: PCT/EP03/00611

FILED: 22 JANUARY 2003

U.S. APPLICATION NO: 10/502,235

35 USC §371 DATE:

FOR: METHODS OF OBTAINING ISOFORM SPECIFIC EXPRESSION IN

MAMMALIAN CELLS

Mail Stop: PCT

Commissioner for Patents

PO Box 1450

Alexandria, VA 22313-1450

### **INFORMATION DISCLOSURE STATEMENT**

Sir:

Applicants believe this paper is being filed before the mailing date of a first Office action on the merits, and so under 37 C.F.R. §1.97(b)(3) no fees are required. If a fee is deemed to be required, the Commissioner is hereby authorized to charge such fee to Deposit Account No. 19-0134.

In accordance with 37 C.F.R. §1.56, applicants wish to call the Examiner's attention to the references cited on the attached form(s) PTO-1449.

The single-asterisked (\*) references were cited in the International Search Report. Since copies of said references were forwarded by the International Bureau, copies of these references are not enclosed. The double-asterisked (\*\*) references were cited in the Search Report of Great Britain and copies are enclosed herewith.

The Examiner is requested to consider the foregoing information in relation to this application and indicate that each reference was considered by returning a copy of the initialed PTO 1449 form(s).

Respectfully submitted,

ha T. Prince torney for Applicants

Reg. No. 43,019

Novartis Corporate Intellectual Property One Health Plaza, Building 430 East Hanover, NJ 07936-1080 (617) 871-3346

Date: October /9, 2004

Sheet 1 of 4

FORM PTO-1449 (REV. 7-85) U.S. DEPARTMENT OF C.DMMERCE PATENT AND TRADEMARK OFFICE

## **INFORMATION DISCLOSURE CITATION**

(Use several sheets if necessary)

ATTY. DOCKET NO. 1-32330A APPLICATION NO. 10/502,235 APPLICANT KISIELOW ET AL. FILING DATE JULY 22, 2004

Group

		-	U.S. P	ATENT DOCUMENTS				•
EXAMINER INITIAL		DOCUMENT NUMBER	DATE	NAME	CLASS	SUBCLASS	S FIL	ING DATE
	AA			· · · · · · · · · · · · · · · · · · ·				
	AB						<del> </del>	
	AC				,			
	AD					1	<del>                                     </del>	
	ΑE					<del> </del>	7	
	AF		,					
	AG					<del> </del>		
	АН							
	ΑI						+	1
	AJ							
	AK				<u> </u>			
	AL							
			FOREIGN	PATENT DOCUMENTS		-	<u> </u>	
		DOCUMENT NUMBER	DATE	OFFICE	CLASS	SUBCLASS	TRANS	SLATION NO
	AM							
	AN							
	AO							
/	AP							
/	ĄQ							
		OTHER DOCU	IMENTS (Inc	luding Author, Title, Date, Pertin	ent pages, Et	c.)		<del></del>
A	AR	Andreadis, et al. "Gene	ration of Prote	ein Isoform Diversity by Alte ell Biol., Vol. 3, pp. 207-42 (	rnativo Sali		nistic a	ind
	AS	Bernstein, et al., "Role for a Bidentate Ribonuclease in the Initiation Step of RNA Interference", Nature, Vol. 409, pp. 363-66 (2001)						
P	· \T	Bonfini, et al., "Not All Shc's Roads Lead to Ras", TIBS, Vol. 21, pp. 257-261 (1996)						
EXAMINER	₹			DATE CONSIDERED		<u>.</u>		

Sheet 2 of #

FORM PTO-1449 (REV. 7-85)

U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE

# INFORMATION DISCLOSURE CITATION

(Use several sheets if necessary)

ATTY. DOCKET NO. 1-32330A APPLICATION NO. 10/502,235 APPLICANT KISIELOW ET AL. FILING DATE JULY 22, 2004

Group

EXAMINER INITIAL	OTHER DOCUMENTS (Including Author, Title, Date, Pertinent pages, Etc.)						
	DA	Bosher, et al., "RNA Interference: Genetic Wand and Genetic Watchdog", Nature Cell Biol., VDA pp. E31-36 (2000)					
	DB	Carthew, "Gene Silencing by Double-Stranded RNA", Current Opin. in Cell Biol., Vol. 13, pp. 244-48 (2001)					
	DC	Cogoni, et al., "Suppression of Gene Expression by Homologous Transgenes", Antonie van Leeuwenhoek, Vol. 65, pp. 205-09, Kluwer Academic Publishers (1994)					
	DD	Cogoni, et al., "Post-transcriptional Gene Silencing Across Kingdoms", Current Opin. in Genetics and Develop., Vol. 10, pp. 638-43 (2000)					
	DE	Elbashir, et al., "Duplexes of 21-nucleotide RNAs Mediate RNA Interference in Cultured Mammalian Cells", Nature, Vol. 411, pp. 494-98 (2001)*					
	DF	Fagard, et al., "Systemic Silencing Signal(s)", Plant Mol. Biol., Vol. 43, pp. 285-93 (2000)					
	DG	Fire, et al., "Potent and Specific Genetic Interference by Double-stranded RNA in Caenorhabditis Elegans", Nature, Vol. 391, pp. 806-11 (1998)					
	DH	Gorman, et al., "Site-specific Gene Targeting for Gene Expression in Eukaryotes", Current Opin. in Biol., Vol. 11, pp. 455-60 (2000)					
	DI	Johnson, et al., "Muscle Creatine Kinase Sequence Elements Re gulating Skeletal and Cardiac Muscle Expression in Transgenic Mice", Mol. and Cell. Biol., Vol. 9, pp. 3393-99 (1989)					
	DJ	Lipardi, et al., "RNAi as Random Degradative PCR: siRNA Primers Convert MRNA into dsRNAs that Are Degraded to Generate New siRNAs", Cell, Vol. 107, pp. 297-307 (2001)					
	DK	Luzi, et al., "Evolution of Shc Functions from Nematode to Human", Current Opin: in Genetics & Develop., Vol. 10, pp. 668-74 (2000)					
	DL Migliaccio, et al., "Opposite Effects of the p52shc/p46shc and p66shc Splicing Isoform Receptor-MAP Kinase-fos signalling Pathway", The Embo Journal, Vol. 16, pp. 706-10						
	DM	Migliaccio, et al., "The p66shc Adaptor Protein Controls Oxidative Stress Response and Life Span in Mammals", Nature, Vol. 402, pp. 309-13 (1999)					
	DN	Muller, "Ten Years of Gene Targeting: Targeted Mouse Mutants, from Vector Design to Phenotype Analysis", Mechanisms of Develop., Vol. 82, pp. 3-21 (1999)					
EXAMINER	ļ	DATE CONSIDERED					

FORM PTO-1449 (REV. 7-85) U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE

## INFORMATION DISCLOSURE CITATION

(Use several sheets if necessary)

ATTY. DOCKET NO. 1-32330A APPLICATION NO. 10/502,235 APPLICANT KISIELOW ET AL. FILING DATE JULY 22, 2004

Group

EXAMINER INITIAL	OTHER DOCUMENTS (Including Author, Title, Date, Pertinent pages, Etc.)					
	t	The state was a second				
	DA	Nakamura, et al., "N-Shc and Sck, Two Neuronally Expressed Shc Adapter Homologs", J. of Biol. Chem., Vol. 273, pp. 6960-67 (1998)				
	DB	Napoli, et al., "Introduction of a Chimeric Chalcone Synthase Gene into Petunia Results in Reversible Co-Suppression of Homologous Genes In Trans", The Plant Cell, Vol. 2, pp. 279-89 (1990)				
	DC	Nishikura, et al., "A Short Primer on RNAi: RNA-Directed RNA Polymerase Acts as a Key Catalyst", Cell, Vol. 107, pp. 415-18 (2001)				
	DD	Sijen, et al., "On the Role of RNA Amplification in dsRNA-triggered Gene Silencing", Cell, Vol. 1 pp. 465-76 (2001)				
•	DE	Tan, "Liver-specific and Position-effect Expression of a Retinol-binding Protein IacZ Fusion Gene (RBP-IacZ) in Transgenic Mice", Develop. Biol, Vol. 146, pp. 24-37 (1991)				
	DF	Tuschl, et al., "Targeted mRNA Degradation by Double-stranded RNA In Vitro", Genes & Develop. Vol. 13, pp. 3191-97 (1999)				
	DG	Van der Krol, et al., "Flavonoid Genes in Petunia: Addition of a Limited Number of Gene Coopies May Lead to a Suppression of Gene Expression", The Plant Cell, Vol. 2, pp. 291-99 (1990)				
	DH	Zamore, "RNAi: Double-stranded RNA directs the ATP-dependent Cleavage of mRNA at 21 to 23 Nucleotide Intervals", Cell, Vol. 101, pp. 25-33 (2000)				
	DI	Zamore, "RNA Interference: Listening to the Sound of Silence", Nature Structural Biol., Vol. 8, pp. 746-50 (2001)				
	DJ	Caplen, et al., "Specific Inhibition of Gene Expression", PNAS, Vol. 98, pp. 9742-47 (2001)**				
	DK	Oka, et al., "Four Subunit a Isoforms of Caenorhabditis Elegans Vasuolar H+ -ATPase", J. of Biol. Chem., Vol. 276, pp. 33079-85 (2001)**				
	DL	Amiri, et al., "An Isoform of EIF4E Is a Component of Germ Granules and Is Required for Spermatogenesis in C. Elegans", Development, Vol. 128, pp. 3899-3912 (2001) **				
	DM	Jedrusik, et al., "A Single Histone H1 Isoform (H1.1) Is Essential for Chromatin Silencing and Germline Development in Caenorhabditis Elegans", Development, Vol. 128, pp. 1069-1080 (2001)**				
	DN	Kisielow, et al., "Isoform-specific Knockdown and Expression of Adaptor Protein SchA Using Small Interfering RNA", Biochem. J., Vol. 363, pp. 1-5 (2002) **				
XAMINER		DATE CONSIDERED				

Sheet 474

FORM PTO-1449 (REV. 7-85)

U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE

## **INFORMATION DISCLOSURE CITATION**

(Use several sheets if necessary)

ATTY. DOCKET NO. 1-32330A APPLICATION NO. 10/502,235 APPLICANT KISIELOW ET AL. FILING DATE JULY 22, 2004

Group

=		· (i)				•		
		•	U.S.	PATENT DOCUMENTS				•
EXAMINER INITIAL		DOCUMENT NUMBER	DATE	NAME	CLASS	SUBCLASS	FIL	ING DATE
	AA							
	AB							
	AC							
	AD				.		$\neg \vdash$	<del></del>
	AE			-	<del></del>			
	AF			······································				<del></del>
	AG			•				
	АН		-			<del> </del>		<del></del>
	ΑI			<del></del>			-	
	AJ						-	
	AK				<del>                                     </del>			T
	AL			· · · · · · · · · · · · · · · · · · ·	<del> </del>		+	· · · · · · · · · · · · · · · · · · ·
			FOREIG	N PATENT DOCUMENTS		I		
						ISLATION		
	AM	WO 0175164 **			CLASS	SUBCLASS	YES	NO
		VVQ 0175164	10/11/01	PCT	_		<u> </u>	<u> </u>
	AN			· · · · · · · · · · · · · · · · · · ·				Ш
	AO							
	AP	·			-			
	AQ		<u> </u>	<u> </u>				
		OTHER DOC	UMENTS (	Including Author, Title, Date, Pertin	ent pages, E	tc.)	•	
	AR	Keiper, et al., "Function Biol. Chem., Vol. 275,		rization of Five elF4E Isoforms 6 (2000)*	s in Caeno	rhabditis Eleç	gans",	J.
	AS	Harborth, et al., "BNAI Based Gene Silencing in Mammalian Tissue Culture Cells: A Key Procedure for Functional Gene Analysis", Mol. Biol. Of the Cell, Vol. 12, pp. 520a-521a (2001) *						
	AT	Harborth, et al., "Ident Interfering RNAs", J. C	ification of E Cell. Sci., Vo	ssential Genes in Cultured Ma . 114, pp. 4557-65 (2001) *	mmalian C	ells Using Sr	nali	<del></del>